

Aberystwyth University

The evolutionarily mismatched nature of modern group makeup and the proposed application of such knowledge on promoting unity among members during times of intergroup conflict

O, Jiaqing

Published in:
Behavioral and Brain Sciences

DOI:
[10.1017/S0140525X19000797](https://doi.org/10.1017/S0140525X19000797)

Publication date:
2019

Citation for published version (APA):
O, J. (2019). The evolutionarily mismatched nature of modern group makeup and the proposed application of such knowledge on promoting unity among members during times of intergroup conflict. *Behavioral and Brain Sciences*, 42, [e134]. <https://doi.org/10.1017/S0140525X19000797>

General rights

Copyright and moral rights for the publications made accessible in the Aberystwyth Research Portal (the Institutional Repository) are retained by the authors and/or other copyright owners and it is a condition of accessing publications that users recognise and abide by the legal requirements associated with these rights.

- Users may download and print one copy of any publication from the Aberystwyth Research Portal for the purpose of private study or research.
- You may not further distribute the material or use it for any profit-making activity or commercial gain
- You may freely distribute the URL identifying the publication in the Aberystwyth Research Portal

Take down policy

If you believe that this document breaches copyright please contact us providing details, and we will remove access to the work immediately and investigate your claim.

tel: +44 1970 62 2400
email: is@aber.ac.uk

COMMENTARY

Target Article Authors: Carsten K.W. De Dreu & Jörg Gross

Word Count: 60 (Abstract); 889 (Main Text); 208 (References); 1235 (Entire Text)

The evolutionarily-mismatched nature of modern group makeup and the proposed application of such knowledge on promoting unity among members during times of intergroup conflict

Jiaqing O

Aberystwyth University

Department of Psychology, Penbryn 5, Penglais Campus, Aberystwyth University, Ceredigion, SY23 3UX, United Kingdom

Tel: +44 (0) 1970 628709

Email: ojthehuman@gmail.com

URL: <https://www.aber.ac.uk/en/psychology/staff-profiles/listing/profile/jio2>

Abstract

Many modern-day groups differ from prehistoric ones regarding the proportion of members who are related to any particular individual. From an evolutionary mismatch lens, an appreciation of this disparity could help to better explain the potential dilution of group cohesion during peacetime and inform novel, more-effective approaches to enhancing group unity – strategies that might enhance national security around the globe.

Main Text

De Dreu and Gross put forth a highly interesting and thought-provoking account of the art of war involving both within-group and intergroup hostilities from a scientific point of view. The authors also offer a useful overview and explanation of how within-group sense of affiliation and collective action can be potentially enhanced by capitalizing on members' sensitivity to external menaces and through utilizing a variety of innovative strategies to ensure loyalty. However, I contend that such knowledge regarding the relationship between group identification and cohesive responses in times of conflict, especially in the modern world, can be further (and significantly) enhanced by incorporating insights from an evolutionary mismatch perspective. Defined as the notion that many present-day issues occur as offshoots resulting from the disparity between the extremely-sluggish process required for genes/psychological mechanisms to evolve and the swift changes in physical and social circumstances that have transpired since prehistory (O, 2018a), evolutionary mismatch has been utilized as a useful framework in interpreting a diverse array of phenomena that ranges from zoophobia (O, 2018b) to reproductive intentions (Li,

Lim, Tsai, & O, 2015) – and could likewise be employed to deepen the understanding of allegiance and cooperation among group members in conflictual situations.

1) Specifically, although the authors' assertion that a lack of any foreseeable attack by foes (e.g., during peacetime) will potentially result in the disintegration of a deterrence-oriented group (because members do not need to be united in order to ward off any act of aggression) makes perfect sense on the face of it, such a suggested phenomenon can veritably only be understood thoroughly through the lens of evolutionary mismatch. In particular, the evolutionary mismatch paradigm could conceivably provide a useful explanation regarding the supposedly fragile nature of group solidarity among individuals in deterrence-oriented groups. Based on such a framework, the logical question to ask is whether the potential dilution of in-group identification and cohesion in conflictual situations (especially during a lull period of relative peace) a modern-world problem?

In light of prevailing knowledge that humans have largely organized themselves together into relatively small, closely-knitted, kin-based groups across much of human evolutionary history (Dunbar, 1993; Hill et al., 2011), the appearance of huge, broadly non-biologically (and non-affinally) related and loosely-connected groups (e.g., countries) in the present day appears to be at odds with the kind of adaptive context humans have evolved from that is favorable for establishing a generally-unfaltering attachment to the group. Humans are expected to be more likely to remain loyal and committed to defending a group mainly made up of biological and affinal kin (than unrelated individuals) because the wellbeing of these members would be directly/indirectly conducive in enabling their own genes to be passed down to the subsequent generations (Hamilton, 1964a, 1964b; Hughes, 1988). In virtue of these, it is reasonable to proffer that, rather than it being a natural consequence due to a lack of any possible act of aggression from external foes as suggested by De Dreu and Gross, members are much less likely to be devoted to their groups in such circumstances *only if* the group is made up primarily of non-kin (a relatively common occurrence in the modern world).

2) Similarly, the evolutionary mismatch framework could also elucidate the underlying rationale regarding the need for, and the (limited) usefulness of various (psychological/social and punitive) strategies indicated by the authors that were designed to induce (continued) commitment and devotion to a group. As members of many modern-day groups are, as indicated above, posited to have a much-greater tendency to experience significant fluctuations in their sense of group loyalty and commitment due to the evolutionarily-novel, largely non-kin makeup of their groups, the adoption of such an assortment of different measures would understandably be required to safeguard group cohesion.

However, while such methods might be useful to a certain extent in enhancing or enforcing group loyalty especially among deterrence-oriented groups, I dispute that they are the most effective. From an evolutionary viewpoint, tactics that attempt to address the evolutionarily-mismatched nature of group makeup among many

present-day groups by prominently highlighting the importance of collective action in dealing with potential threats to one's evolutionarily salient in-group members (e.g., relatives) will conceivably be much more effective (Hamilton, 1964a, 1964b; Hughes, 1988). For instance, a country is believed to be more likely to succeed at motivating its soldiers to stay united and be constantly prepared to deal with any future attack if it emphasizes the importance of national security in protecting the soldiers' own kin from eventual harm (as compared to the diverse strategies indicated by the authors). By the same token, measures that promote a sense of kin-like bond among members who are not otherwise biologically or affinally connected could analogously be more effective at enhancing and maintaining cohesion and loyalty (Griskevicius, Cantú, & Vugt, 2012). Creating/developing the notion that a country's soldiers are all just like siblings to one another, as another corresponding example, will imaginably also be more beneficial in preserving their allegiance to the nation.

Taken together, I argue that viewing the issue of group cohesion during intergroup conflict from a novel evolutionary mismatch angle will provide some new insights into the phenomenon which could complement the valuable information and ideas contributed by the authors and afford creative ways of improving in-group loyalty that might have important relevance for national security in the contemporary world.

References

- Dunbar, R. I. (1993). Coevolution of neocortical size, group size and language in humans. *Behavioral and Brain Sciences*, 16, 681-694.
- Griskevicius, V., Cantú, S. M., & Vugt, M. V. (2012). The evolutionary bases for sustainable behavior: Implications for marketing, policy, and social entrepreneurship. *Journal of Public Policy & Marketing*, 31, 115-128.
- Hamilton, W. D. (1964a). The genetical evolution of social behavior: I. *Journal of Theoretical Biology*, 7, 1-16.
- Hamilton, W. D. (1964b). The genetical evolution of social behavior: II. *Journal of Theoretical Biology*, 7, 17-52.
- Hill, K. R., Walker, R. S., Božičević, M., Eder, J., Headland, T., Hewlett, B., ... & Wood, B. (2011). Co-residence patterns in hunter-gatherer societies show unique human social structure. *Science*, 331, 1286-1289.
- Hughes, A. L. (1988). *Evolution and human kinship*. New York: Oxford University Press.
- Li, N. P., Lim, A. J. Y., Tsai, M-H., & O, J. (2015). Too materialistic to get married and have children? *PLOS One*, 10, e0126543.

O, J. (2018a). Learned helplessness from an evolutionary mismatch perspective. In T. K. Shackelford & V. A. Weekes-Shackelford (Eds.), *Encyclopedia of evolutionary psychological science*. Cham: Springer Nature.

O, J. (2018b). Self-Efficacy, Animal Phobias and Evolutionary Mismatch. In T. K. Shackelford & V. A. Weekes-Shackelford (Eds.), *Encyclopedia of evolutionary psychological science*. Cham: Springer Nature.